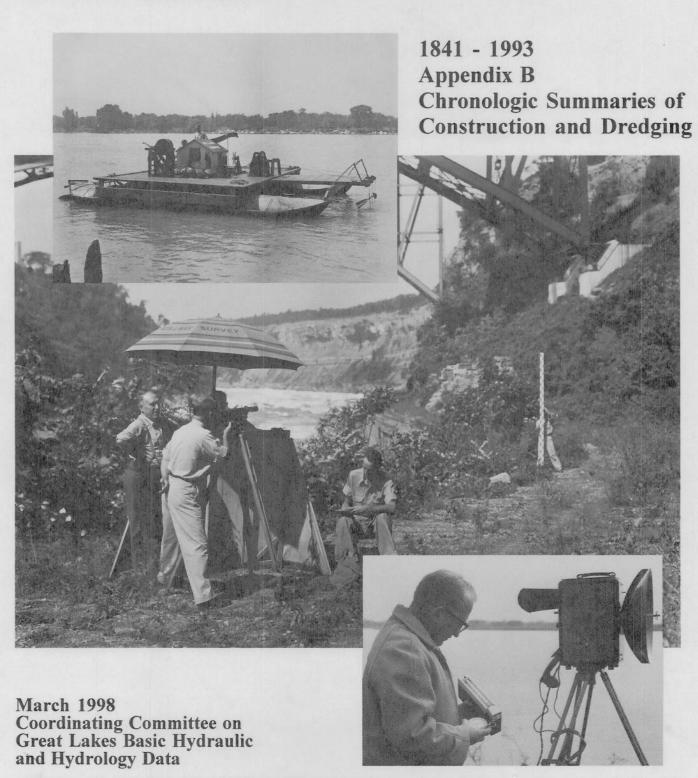
Hydraulic Discharge Measurements and Regimen Changes on the Great Lakes Connecting Channels and The International Section of the St. Lawrence River



# HYDRAULIC DISCHARGE MEASUREMENTS AND REGIMEN CHANGES ON THE GREAT LAKES CONNECTING CHANNELS AND THE INTERNATIONAL SECTION OF THE ST. LAWRENCE RIVER

### APPENDIX B

CHRONOLOGIC SUMMARIES
OF
CONSTRUCTION AND DREDGING

1841 - 1993

March 1998

Coordinating Committee on Great Lakes Basic Hydraulic and Hydrologic Data

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# HYDRAULIC DISCHARGE MEASUREMENTS AND REGIMEN CHANGES ON THE GREAT LAKES CONNECTING CHANNELS AND THE INTERNATIONAL SECTION OF THE ST. LAWRENCE RIVER

#### APPENDIX B

# CHRONOLOGIC SUMMARIES OF CONSTRUCTION AND DREDGING

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#### **EXECUTIVE SUMMARY**

An important part of the Great Lakes system's data collection program is the measurement of the discharge (flow) in the system's connecting channels - the St. Marys, St. Clair, Detroit, and Niagara Rivers - and the International Section of the St. Lawrence River. As such, at a meeting of the Coordinating Committee on Great Lakes Basic Hydraulic and Hydrologic Data, on June 23, 1976, the Committee's River Flow Subcommittee was requested to prepare two documents, the first outlining the procedures employed for measuring flows in the Great Lakes connecting channels and the International Section of the St. Lawrence River, and the second to document the history of all flow measurements and regimen changes in the same water bodies.

The first request was satisfied with the publishing, in October 1991, of the report entitled "Discharge Measurement Procedures on the Great Lakes Connecting Channels and the International Section of the St. Lawrence River". The second request was addressed in three documents: 1) a main report, published in March 1994, entitled "Hydraulic Discharge Measurements and Regimen Changes on the Great Lakes Connecting Channels and the International Section of the St. Lawrence River", including Appendix A, entitled "Discharge Measurement Reduction, U.S. Army Corps of Engineers, Detroit District, Program 4316"; 2) an Appendix C, which was also published in March 1994, entitled "Table Summaries of Discharge Measurements"; and 3) the document herein (Appendix B), entitled "Chronologic Summaries of Construction and Dredging". This third document is intended to contribute to the fulfillment of the second part of the Committee's request.

Appendix B lists, by river and in chronologic order (Fiscal Year unless noted), the construction and dredging that occurred in each of the four major connecting channels of the Great Lakes and the St. Lawrence River. This listing may not be all inclusive. It includes information mainly from extract documents to reports entitled "Annual Report of the Secretary of the Army on Civil Works Activities", prepared by the United States Department of the Army, Corps of Engineers; and, as noted in Appendix B, information from a report entitled "History of Canals and Related Subjects", dated September 1949, prepared by the then Department of Transport, General Engineering Branch, Ottawa, Canada. Information pertaining to the Saint Lawrence Seaway construction was further obtained from the Saint Lawrence Seaway Development Corporation, U.S. Department of Transport. An additional detailed report was reviewed and is cited here as an additional reference. It is entitled "St. Clair River, Lake St. Clair, and Detroit River - Description and History of the Navigation Improvements and Other Structures Affecting the Levels and Discharges Thereof", published in December 1928 by the then Department of the Interior, Canada, Dominion Water Power and Reclamation Service. It is listed as Report number 1264, in two volumes, and details information for the period 1855 to 1928. It is beyond the scope of this effort to try and identify all localized construction and dredging projects that may have occurred. In addition, maintenance dredging has not been included.

Fiscal years are noted in this Appendix and they refer to United States fiscal years. The Fiscal Year time period has changed over the years: through 1975, the Fiscal Year was 1 July through 30 June. What is known as the "T-Quarter" (transitional quarter) occurred in 1976. This period extended from 1 July to 30 September 1976. The latest Fiscal Year period is from 1 October through 30 September.